SEQUENCE LISTING

<110> Chen et al.

<120> METHODS AND COMPOSITIONS FOR STIMULATING AXON REGENERATION AND PREVENTING NEURONAL CELL DEGENERATION

<130> ERM-105.01
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Gly Tyr Asp Asn Arg Glu Ile Val Met Lys Tyr Ile His Tyr Lys Leu
        10                  15                  20

tcg cag agg ggc tac gag tgg gat gcg gga gat gtg ggc gcc gcg ccc      148
Ser Gln Arg Gly Tyr Glu Trp Asp Ala Gly Asp Val Gly Ala Ala Pro
    25                  30                  35

ccg ggg gcc gcc ccc gcg ccg ggc atc ttc tcc tcg cag ccc ggg cac      196
Pro Gly Ala Ala Pro Ala Pro Gly Ile Phe Ser Ser Gln Pro Gly His
40                  45                  50                  55

acg ccc cat aca gcc gca tcc cgg gac ccg gtc gcc agg acc tcg ccg      244
Thr Pro His Thr Ala Ala Ser Arg Asp Pro Val Ala Arg Thr Ser Pro
                60                  65                  70

ctg cag acc ccg gct gcc ccc ggc gcc gcc gcg ggg cct gcg ctc agc      292
Leu Gln Thr Pro Ala Ala Pro Gly Ala Ala Ala Gly Pro Ala Leu Ser
            75                  80                  85

ccg gtg cca cct gtg gtc cac ctg acc ctc cgc cag gcc ggc gac gac      340
Pro Val Pro Pro Val Val His Leu Thr Leu Arg Gln Ala Gly Asp Asp
        90                  95                  100

ttc tcc cgc cgc tac cgc cgc gac ttc gcc gag atg tcc agg cag ctg      388
Phe Ser Arg Arg Tyr Arg Arg Asp Phe Ala Glu Met Ser Arg Gln Leu
    105                 110                 115

cac ctg acg ccc ttc acc gcg cgg gga cgc ttt gcc acg gtg gtg gag      436
His Leu Thr Pro Phe Thr Ala Arg Gly Arg Phe Ala Thr Val Val Glu
120                 125                 130                 135

gag ctc ttc agg gac ggg gtg aac tgg ggg agg att gtg gcc ttc ttt      484
Glu Leu Phe Arg Asp Gly Val Asn Trp Gly Arg Ile Val Ala Phe Phe
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140 145 150

gag ttc ggt ggg gtc atg tgt gtg gag agc gtc aac cgg gag atg tcg 532
Glu Phe Gly Gly Val Met Cys Val Glu Ser Val Asn Arg Glu Met Ser
155 160 165

ccc ctg gtg gac aac atc gcc ctg tgg atg act gag tac ctg aac cgg 580
Pro Leu Val Asp Asn Ile Ala Leu Trp Met Thr Glu Tyr Leu Asn Arg
170 175 180

cac ctg cac acc tgg atc cag gat aac gga ggc tgg gat gcc ttt gtg 628
His Leu His Thr Trp Ile Gln Asp Asn Gly Gly Trp Asp Ala Phe Val
185 190 195

gaa ctg tac ggc ccc agc atg cgg cct ctg ttt gat ttc tcc tgg ctg 676
Glu Leu Tyr Gly Pro Ser Met Arg Pro Leu Phe Asp Phe Ser Trp Leu
200 205 210 215

tct ctg aag act ctg ctc agt ttg gcc ctg gtg gga gct tgc atc acc 724
Ser Leu Lys Thr Leu Leu Ser Leu Ala Leu Val Gly Ala Cys Ile Thr
220 225 230

ctg ggt gcc tat ctg ggc cac aag tga agtcaacatg cctgccccaa 771
Leu Gly Ala Tyr Leu Gly His Lys
235

acaaatatgc aaaaggttca ctaaagcagt agaaataata tgcattgtca gtgatgttcc 831

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Met Ala His Ala Gly Arg Thr Gly Tyr Asp Asn Arg Glu Ile Val Met
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Lys Tyr Ile His Tyr Lys Leu Ser Gln Arg Gly Tyr Glu Trp Asp Ala
20 25 30

Gly Asp Val Gly Ala Ala Pro Pro Gly Ala Ala Pro Ala Pro Gly Ile
35 40 45

Phe Ser Ser Gln Pro Gly His Thr Pro His Thr Ala Ala Ser Arg Asp
50 55 60

Pro Val Ala Arg Thr Ser Pro Leu Gln Thr Pro Ala Ala Pro Gly Ala

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65                  70                  75                  80

Ala Ala Gly Pro Ala Leu Ser Pro Val Pro Pro Val Val His Leu Thr
                85                  90                  95

Leu Arg Gln Ala Gly Asp Asp Phe Ser Arg Arg Tyr Arg Arg Asp Phe
            100                 105                 110

Ala Glu Met Ser Arg Gln Leu His Leu Thr Pro Phe Thr Ala Arg Gly
        115                 120                 125

Arg Phe Ala Thr Val Val Glu Glu Leu Phe Arg Asp Gly Val Asn Trp
    130                 135                 140

Gly Arg Ile Val Ala Phe Phe Glu Phe Gly Gly Val Met Cys Val Glu
145                 150                 155                 160

Ser Val Asn Arg Glu Met Ser Pro Leu Val Asp Asn Ile Ala Leu Trp
                165                 170                 175

Met Thr Glu Tyr Leu Asn Arg His Leu His Thr Trp Ile Gln Asp Asn
            180                 185                 190

Gly Gly Trp Asp Ala Phe Val Glu Leu Tyr Gly Pro Ser Met Arg Pro
        195                 200                 205

Leu Phe Asp Phe Ser Trp Leu Ser Leu Lys Thr Leu Leu Ser Leu Ala
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Leu Val Gly Ala Cys Ile Thr Leu Gly Ala Tyr Leu Gly His Lys
225                 230                 235


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tccctattat aaaa atg tct cag agc aac cgg gag ctg gtg gtt gac ttt      170
               Met Ser Gln Ser Asn Arg Glu Leu Val Val Asp Phe
               1               5                   10

ctc tcc tac aag ctt tcc cag aaa gga tac agc tgg agt cag ttt agt      218
Leu Ser Tyr Lys Leu Ser Gln Lys Gly Tyr Ser Trp Ser Gln Phe Ser
        15                  20                  25

gat gtg gaa gag aac agg act gag gcc cca gaa ggg act gaa tcg gag      266
Asp Val Glu Glu Asn Arg Thr Glu Ala Pro Glu Gly Thr Glu Ser Glu
    30                  35                  40
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atg gag acc ccc agt gcc atc aat ggc aac cca tcc tgg cac ctg gca      314
Met Glu Thr Pro Ser Ala Ile Asn Gly Asn Pro Ser Trp His Leu Ala
45                  50                  55                  60

gac agc ccc gcg gtg aat gga gcc act gcg cac agc agc agt ttg gat      362
Asp Ser Pro Ala Val Asn Gly Ala Thr Ala His Ser Ser Ser Leu Asp
                65                  70                  75

gcc cgg gag gtg atc ccc atg gca gca gta aag caa gcg ctg agg gag      410
Ala Arg Glu Val Ile Pro Met Ala Ala Val Lys Gln Ala Leu Arg Glu
            80                  85                  90

gca ggc gac gag ttt gaa ctg cgg tac cgg cgg gca ttc agt gac ctg      458
Ala Gly Asp Glu Phe Glu Leu Arg Tyr Arg Arg Ala Phe Ser Asp Leu
        95                  100                 105

aca tcc cag ctc cac atc acc cca ggg aca gca tat cag agc ttt gaa      506
Thr Ser Gln Leu His Ile Thr Pro Gly Thr Ala Tyr Gln Ser Phe Glu
    110                 115                 120

cag gta gtg aat gaa ctc ttc cgg gat ggg gta aac tgg ggt cgc att      554
Gln Val Val Asn Glu Leu Phe Arg Asp Gly Val Asn Trp Gly Arg Ile
125                 130                 135                 140

gtg gcc ttt ttc tcc ttc ggc ggg gca ctg tgc gtg gaa agc gta gac      602
Val Ala Phe Phe Ser Phe Gly Gly Ala Leu Cys Val Glu Ser Val Asp
                145                 150                 155

aag gag atg cag gta ttg gtg agt cgg atc gca gct tgg atg gcc act      650
Lys Glu Met Gln Val Leu Val Ser Arg Ile Ala Ala Trp Met Ala Thr
            160                 165                 170

tac ctg aat gac cac cta gag cct tgg atc cag gag aac ggc ggc tgg      698
Tyr Leu Asn Asp His Leu Glu Pro Trp Ile Gln Glu Asn Gly Gly Trp
        175                 180                 185

gat act ttt gtg gaa ctc tat ggg aac aat gca gca gcc gag agc cga      746
Asp Thr Phe Val Glu Leu Tyr Gly Asn Asn Ala Ala Ala Glu Ser Arg
    190                 195                 200

aag ggc cag gaa cgc ttc aac cgc tgg ttc ctg acg ggc atg act gtg      794
Lys Gly Gln Glu Arg Phe Asn Arg Trp Phe Leu Thr Gly Met Thr Val
205                 210                 215                 220

gcc ggc gtg gtt ctg ctg ggc tca ctc ttc agt cgg aaa tga              836
Ala Gly Val Val Leu Leu Gly Ser Leu Phe Ser Arg Lys
                225                 230

ccagacactg accatccact ctaccctccc acccccttct ctgctccacc acatcctccg    896

tccagccgcc attgccacca ggagaacccg                                     926


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Met Ser Gln Ser Asn Arg Glu Leu Val Val Asp Phe Leu Ser Tyr Lys
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Leu Ser Gln Lys Gly Tyr Ser Trp Ser Gln Phe Ser Asp Val Glu Glu
            20                  25                  30

Asn Arg Thr Glu Ala Pro Glu Gly Thr Glu Ser Glu Met Glu Thr Pro
        35                  40                  45

Ser Ala Ile Asn Gly Asn Pro Ser Trp His Leu Ala Asp Ser Pro Ala
    50                  55                  60

Val Asn Gly Ala Thr Ala His Ser Ser Ser Leu Asp Ala Arg Glu Val
65                  70                  75                  80

Ile Pro Met Ala Ala Val Lys Gln Ala Leu Arg Glu Ala Gly Asp Glu
                85                  90                  95

Phe Glu Leu Arg Tyr Arg Arg Ala Phe Ser Asp Leu Thr Ser Gln Leu
            100                 105                 110

His Ile Thr Pro Gly Thr Ala Tyr Gln Ser Phe Glu Gln Val Val Asn
        115                 120                 125

Glu Leu Phe Arg Asp Gly Val Asn Trp Gly Arg Ile Val Ala Phe Phe
    130                 135                 140

Ser Phe Gly Gly Ala Leu Cys Val Glu Ser Val Asp Lys Glu Met Gln
145                 150                 155                 160

Val Leu Val Ser Arg Ile Ala Ala Trp Met Ala Thr Tyr Leu Asn Asp
                165                 170                 175

His Leu Glu Pro Trp Ile Gln Glu Asn Gly Gly Trp Asp Thr Phe Val
            180                 185                 190

Glu Leu Tyr Gly Asn Asn Ala Ala Ala Glu Ser Arg Lys Gly Gln Glu
        195                 200                 205

Arg Phe Asn Arg Trp Phe Leu Thr Gly Met Thr Val Ala Gly Val Val
    210                 215                 220

Leu Leu Gly Ser Leu Phe Ser Arg Lys
225                 230
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